BCS Level 3 IT Solutions Technician EPA Knowledge Unit Methodologies and Principles

Specimen Paper

Record your surname / last / family name and initials on the answer sheet.

Specimen paper only 10 multiple-choice questions – 1 mark awarded to each question. Mark only one answer to each question. There are no trick questions.

A number of possible answers are given for each question, indicated by either **A. B. C. or D**. Your answers should be clearly indicated on the answer sheet.

This knowledge unit is regulated by the following United Kingdom Regulator – NSAR.

1   What is the **MAIN** goal of the software development lifecycle?

A   To provide a process to solve a business problem.
B   To provide a process to create a hardware solution.
C   To provide a process to deliver a software application.
D   To provide a process to install 3rd party software.

2   Which statement below **BEST** describes the maintenance stage during the solution delivery lifecycle?

A   It covers all aspects of on-going support for the solution.
B   It focuses on the communication of the maintenance team.
C   It involves all the system check-ups and periodic updates.
D   It covers all the training requirements for the solution.

3   What **TYPICALLY** occurs during the analysis phase of the solution delivery lifecycle?

A   To plan all the resources needed for the given solution.
B   To review requirements in order to design the solution.
C   To implement a solution based upon the requirements.
D   To gather the requirements from all of the stakeholders.

4   Which software development method allows software to be deployed for client use after each iteration?

A   V-Model.
B   Waterfall.
C   Unified Process (UP).
D   Agile.

5   When implementing a hardware solution, what advantage would a waterfall methodology provide?

A   Stakeholders can easily change the solution's requirements.
B   Provides the opportunity for greater stakeholder involvement.
C   Requirements are unlikely to change when building a solution.
D   Clients get to see the solution regularly through the process.

6 Which of the following statements **BEST** describes the purpose of change management?

A It controls and manages the flow of changes to reduce risk.
B It is used to increase the speed and volume of changes.
C It makes it easier for new team members to make changes.
D It adds an additional layer of security testing to changes.

7 What is the **MAIN** goal the formation of DevOps teams aims to achieve?

A To replace the development and operations teams into a combined team.
B To enable the developer team to better support the software applications.
C To remove responsibility from developers of supporting their applications.
D To enable developer and operations teams to work more closely together.

8 Which of the below **BEST** describes an IT solution?

A A technical solution that is being developed for a business problem.
B A tested and deployed technical solution to a given business problem.
C An IT solution that has been fully developed and tested for a business.
D A business problem that has had a technical solution fully designed.

9 Which statement below **BEST** describes why re-use is important when designing a solution?

A Re-usable solutions are flexible and need more testing.
B Re-usable solutions are quicker and easier to build.
C Re-usable solutions save time and reduce costs.
D Re-usable solutions are more secure and compliant.

10 Which of the below **BEST** describes why non-functional testing is needed?

A To ensure a solution operates to an acceptable level of performance.
B To ensure the solution works in a range of unusual, extreme situations.
C To ensure the solution meets the requirements laid out in the design.
D To ensure that the customer can check the solution before it goes live.

End of Paper